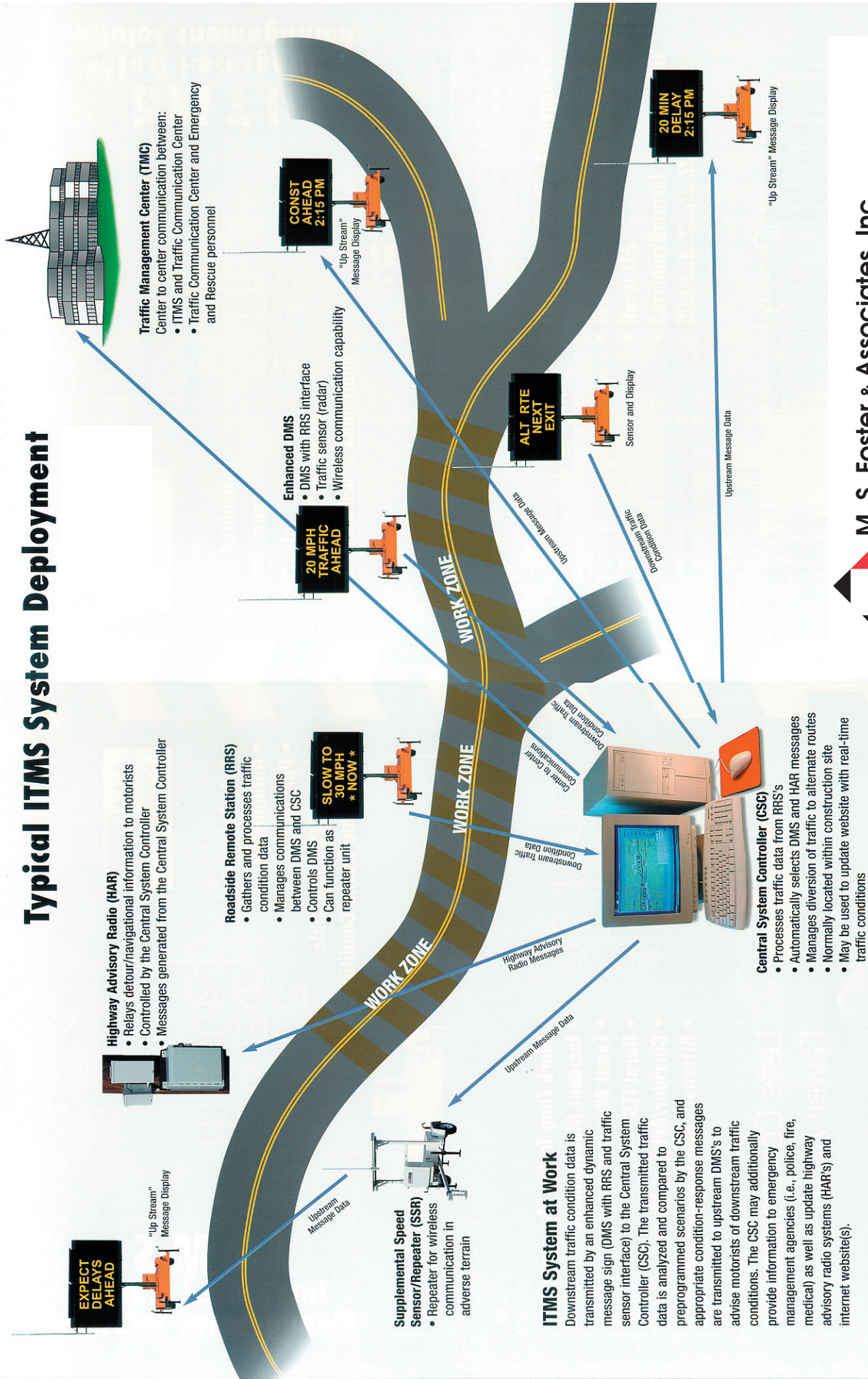


Typical ITMS System Deployment



Highway Advisory Radio (HAR)

- Relays detour/navigation information to motorists
- Controlled by the Central System Controller
- Messages generated from the Central System Controller

Roadside Remote Station (RRS)

- Gathers and processes traffic condition data
- Manages communications between DMS and CSC
- Controls DMS
- Can function as repeater unit

Supplemental Speed Sensor/Repeater (SSR)

- Repeater for wireless communication in adverse terrain

ITMS System at Work

Downstream traffic condition data is transmitted by an enhanced dynamic message sign (DMS with RRS and traffic sensor interface) to the Central System Controller (CSC). The transmitted traffic data is analyzed and compared to preprogrammed scenarios by the CSC, and appropriate condition-response messages are transmitted to upstream DMS's to advise motorists of downstream traffic conditions. The CSC may additionally provide information to emergency management agencies (i.e., police, fire, medical) as well as update highway advisory radio systems (HAR's) and internet website(s).

Central System Controller (CSC)

- Processes traffic data from RRS's
- Automatically selects DMS and HAR messages
- Manages diversion of traffic to alternate routes
- Normally located within construction site
- May be used to update website with real-time traffic conditions

Traffic Management Center (TMC)

Center to center communication between:

- ITMS and Traffic Communication Center
- Traffic Communication Center and Emergency and Rescue personnel

Enhanced DMS

- DMS with RRS interface
- Traffic sensor (radar)
- Wireless communication capability